

<b>Notice of Allowability</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/944,475	GALLIVAN, DAN	
	<b>Examiner</b>	<b>Art Unit</b>	
	Peter-Anthony Pappas	2671	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--**

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to 8/31/2001.
2. ☒ The allowed claim(s) is/are 1-57.
3. ☐ The drawings filed on \_\_\_\_\_ are accepted by the Examiner.
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a) ☐ All    b) ☐ Some\*    c) ☐ None    of the:
  1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\* Certified copies not received: \_\_\_\_\_.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

**THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.**

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
6. ☒ CORRECTED DRAWINGS ( as "replacement sheets") must be submitted.
  - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review ( PTO-948) attached
    - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date \_\_\_\_\_.
  - (b) ☒ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date \_\_\_\_\_.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

**Attachment(s)**

- |  |   |
|--|---|
| 1. <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 5. <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)                       |
| 2. <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 6. <input checked="" type="checkbox"/> Interview Summary (PTO-413),<br>Paper No./Mail Date _____. |
| 3. <input checked="" type="checkbox"/> Information Disclosure Statements (PTO-1449 or PTO/SB/08),<br>Paper No./Mail Date _____ | 7. <input checked="" type="checkbox"/> Examiner's Amendment/Comment                               |
| 4. <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit<br>of Biological Material                     | 8. <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance              |
|  | 9. <input type="checkbox"/> Other _____.  |

### EXAMINER'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Patrick Inouye on 9/24/04.

The application has been amended as follows:

2. The following changes to the drawings have been approved by the examiner and agreed upon by applicant: See the attached drawing corrections. In order to avoid abandonment of the application, applicant must make these above agreed upon drawing changes.

New corrected drawings in compliance with 37 CFR 1.121(d) are required in this application. Applicant is advised to employ the services of a competent patent draftsman outside the Office, as the U.S. Patent and Trademark Office no longer prepares new drawings. The corrected drawings are required in reply to the Office action to avoid abandonment of the application. The requirement for corrected drawings will not be held in abeyance.

3. Page 7, lines 16-19, replace "Application Serial No. \_\_\_\_\_, entitled "System and Method For Efficiently Generating Cluster Groupings In A Multi-Dimensional Concept Space" with --No. 6, 778, 995, issued August 17, 2004--.

4. Page 8, lines 1-4, replace " \_\_\_\_\_ " with --09/944, 474--.

5. Page 10, line 28, replace "110-115" with --111-116--.
6. Page 10, line 5, replace "e 71-75" with --e 72-75--.
7. Claim 19, line 2, replace "Claims 10,11, 12, 13, 14, 15, 16, 17, and 18" with --  
Claims 10,11, 12, 13, 14, 15, 16, 17, or 18--.
8. Claim 57, line 2, replace "Claims 50, 51, 52, 53, 54, 55, and 56" with --Claims 50,  
51, 52, 53, 54, 55, or 56--.
9. Claim 20, line 14, after "of the convex clusters" insert --, wherein the new fixed  
distance substantially equals a root of a quadratic equation formed by the original fixed  
distances of the clusters and angle formed there between--.
10. Claim 31, lines 12, after "cluster if the span is less than the sum of the segments  
of the convex clusters" insert --, wherein the new fixed distance substantially equals a  
root of a quadratic equation formed by the original fixed distances of the clusters and  
angle formed there between--.

***Allowable Subject Matter***

11. Claims 1-57 are allowed.
12. In regards to claims 1 and 10 the prior art of record does not disclose or suggest  
a distance determining module determining a perspective-corrected independent  
distance from the common origin for one such cluster if the span does not substantially  
equal the sum of the independent radii of the clusters, the perspective-corrected  
independent distance substantially equaling a root of a quadratic equation formed by  
the independent distances of the clusters and angle formed there between.

13. In regards to claims 43 and 50 the prior art of record does not disclose or suggest determining a perspective-corrected independent distance from the common origin for one such convex shape if the span does not substantially equal the sum of the distances of center of mass to point closest to the other convex shape of each convex shape, the perspective-corrected independent distance substantially equaling a root of a quadratic equation formed by the independent distances of the convex shapes and angle formed there between.

14. In regards to claims 20 and 31 the prior art of record does not disclose or suggest evaluating a new fixed distance from the common origin for the center of mass for one of the convex clusters located along the vector for that convex cluster if the span is less than the sum of the segments of the convex clusters, wherein the new fixed distance substantially equals a root of a quadratic equation formed by the original fixed distances of the clusters and angle formed there between.

15. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

### ***Conclusion***

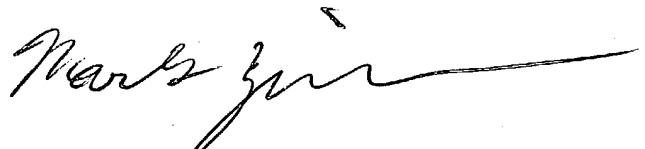
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Peter-Anthony Pappas whose telephone number is 703-305-8984. The examiner can normally be reached on M-F 10:00am-6:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mark Zimmerman can be reached on 703-305-9798. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Peter-Anthony Pappas  
Examiner  
Art Unit 2671

PAP

A handwritten signature in black ink, appearing to read "Mark Zimmerman", with a long horizontal flourish extending to the right.

MARK ZIMMERMAN  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 2600